ATTACHMENT A
Amendments to the Claims

This listing of claims will replace all prior versions, and listings, of claims in the Application, and any claims canceled herein are canceled without prejudice to their refilling in this application or subsequent applications based on this application.

1. (Previously presented) A process for the production of L-epi-2-inosose, characterized in that the process comprises cultivating a microorganism selected from the group consisting of Xanthomonas sp. AB 10119 strain (deposited under FERM BP--7168), Pseudomonas sp. AB 10215 strain (deposited under FERM BP-7170) and Erwinia sp. 10135 strain (deposited under FERM BP-7169), under aerobic conditions in a liquid culture medium containing an amount of myo-inositol, carbon sources and nitrogen sources, whereby myo-inositol is contacted and reacted with the cells of said microorganism in the culture medium to produce and accumulate L-epi-2-inosose in the resulting culture broth.

2-6. (Canceled)

7. (Previously presented) A process for the production of L-epi-inosose, which comprises the steps of cultivating a microorganism selected from the group consisting of Xanthomonas sp. AB 10119 strain (deposited under FERM BP-7168), Pseudomonas, sp. AB 10215 strain (deposited under FERM BP-7170) and Erwinia sp. 10135 strain (deposited under FERM BP-7169), under aerobic conditions in a liquid culture medium,

separating the microbial cells of the cultivated microorganism from the resulting culture broth, adding the so separated microbial cells to an aqueous buffer solution or a liquid culture medium containing an amount of myo-inositol dissolved therein, and contacting and reacting the so added microbial cells with myo-inositol in said aqueous buffer solution or said liquid culture medium to convert myo-inositol and to produce L-epi-2-inosose in the resulting reaction solution or the resulting culture broth.

8. (Currently Amended) The~~A~~ process as claimed in Claim 1, wherein the culture broth or the reaction solution containing the microbial cells and L-epi-2-inosose as produced and accumulated therein is obtained in the process of Claim 1, followed by removing the microbial cells of the microorganism from said culture broth or said reaction solution, and wherein the resulting culture broth supernatant or the resulting filtrate of the reaction solution as obtained upon the removal of the microbial cells from said culture broth or from said reaction solution containing L-epi-2-inosose therein is then subjected to a treatment with ion-exchange resin(s) or to a treatment with activated carbon or to a treatment for crystallization of L-epi-2-inosose or to any combination of these treatments, whereby L-epi-2-inosose of a high purity is recovered from said culture broth supernatant or from said filtrate of the reaction solution.

9. (Previously presented) A process for the production of epi-inositol, characterized in that the process comprises the steps of contacting and reacting the cells of a microorganism selected from the group consisting of Xanthomonas sp. AB 10119 strain (deposited under FERM BP-7168), Pseudomonas sp. AB 10215 strain

(deposited under FERM BP-7170) and Erwinia sp. 10135 strain (deposited under FERM BP-7169), with myo-inositol in an aqueous reaction medium to produce L-epi-2-inosose in said aqueous reaction medium, thereby affording the resulting reaction solution containing the microbial cells of said microorganism and the produced L-epi-2-inosose therein, removing the microbial cells from said reaction solution to give a reaction solution filtrate containing L-epi-2-inosose, adding an appropriate reducing agent directly to said reaction solution filtrate containing L-epi-2-inosose, and reacting the reducing agent with L-epi-2-inosose to produce epi-inositol and myo-inositol.

10-13. (Canceled)

14. (Currently Amended) TheA process as claimed in Claim 9, which comprises the step of cultivating under aerobic conditions a microorganism selected from the group consisting of Xanthomonas sp. AB 10119 strain (deposited under FERM BP-7168), Pseudomonas sp. AB 10215 strain (deposited under FERM BP-7170) and Erwinia sp. 10135 strain (deposited under FERM BP-7169), in an aqueous reaction medium composed of a liquid culture medium containing an amount of myo-inositol, carbon sources and nitrogen sources, thereby to contact and react myo-inositol with the cells of said microorganism in said aqueous reaction medium, and thereby producing and accumulating L-epi-2-inosose in the resulting culture broth to afford a culture broth which is the resulting reaction solution containing the microbial cells of said microorganism and L-epi-2-inosose therein; as well as the step of removing the microbial cells of said microorganism from said resulting reaction solution, to produce a

culture broth supernatant which is the filtrate of said reaction solution containing L-epi-2-inosose; and the steps of then adding directly to said culture broth supernatant an alkali metal boron hydride, an alkali metal tri-alkoxyboron hydride or an alkali metal boron cyanide as the reducing agent, and effecting the reductive reaction of L-epi-2-inosose with this reducing agent, thereby to produce epi-inositol and myo-inositol in said culture broth supernatant, the step of recovering the epi-inositol and myo-inositol from the resultant reaction solution of the reductive reaction, and the step of separating the recovered epi-inositol and myo-inositol from each other.

15. (Currently Amended) TheA process as claimed in Claim 9, which comprises the steps of cultivating under aerobic conditions a microorganism selected from the group consisting of Xanthomonas sp. AB 10119 strain (deposited under FERM BP-7168), Pseudomonas sp. AB 10215 strain (deposited under FERM BP-7170) and Erwinia sp. 10135 strain (deposited under FERM BP-7169), in a liquid culture medium containing carbon sources and nitrogen sources, thereby to afford a culture broth of said microorganism, and then separating the microbial cells of said microorganism from the resultant culture broth; the step of contacting and reacting the so separated microbial cells of said microorganism with myo-inositol in an aqueous reaction medium composed of an aqueous buffer solution or of a liquid culture medium, to produce L-epi-2-inosose in said aqueous reaction medium; the step of removing the microbial cells of said microorganism from the resulting aqueous reaction solution containing the microbial cells and the so produced L-epi-2-inosose therein, to afford a filtrate of said reaction solution from which the microbial cells have been removed but in which L-epi-2-inosose

remains dissolved; the steps of adding to said reaction solution filtrate an alkali metal boron hydride, an alkali metal tri-alkoxyboron hydride or an alkali metal boron cyanide as a reducing agent, and effecting the reductive reaction of L-epi-2-inosose with said reducing agent, thereby to produce epi-inositol and myo-inositol in said reaction solution filtrate; the step of recovering the epi-inositol and myo-inositol from the resulting reaction solution of the reductive reaction which is containing the epi-inositol and myo-inositol so produced; and the step of separating the so recovered epi-inositol and myo-inositol from each other.

16. (Currently Amended) The~~A~~ process as claimed in Claim 14, wherein, before conducting the step of effecting the reductive reaction of L-epi-2-inosose with the reducing agent as added, there is interposed a preliminary step in which the pH of the aqueous medium composed of the culture broth supernatant or of the reaction solution filtrate containing L-epi-2-inosose therein is once adjusted to an alkaline pH in a range of pH 8 to 12; and wherein there is then conducted the step which comprises adding to said aqueous medium containing L-epi-2-inosose and having a pH of 8 to 12 an alkali metal boron hydride, an alkali metal tri-alkoxyboron hydride or an alkali metal boron cyanide as the reducing agent, and effecting the reductive reaction of L-epi-2- inosose with said reducing agent, whereby the desired epi-inositol is produced in a yield much greater than that of the by-produced myo-inositol.

17. (Original) The~~A~~ process as claimed in Claim 9, wherein the reducing agent to be used for the reductive reaction of L-epi-2-inosose is chosen from sodium boron

hydride, lithium boron hydride, potassium boron hydride, sodium tri-methoxyboron hydride and sodium boron cyanide hydride.

18. (Original) TheA process as claimed in Claim 9, wherein the aqueous reaction medium to be used is water, and the reducing agent to be used is sodium boron hydride.

19. (Previously presented) A biologically pure culture of Xanthomonas sp. AB 10119 strain which has a characteristic nature capable of converting myo-inositol into L-epi-2-inosose and which has been deposited under the deposit number of FERM BP-7168 in the National Institute of Bioscience and Human Technology, Agency of Industrial Science and Technology, in Japan.

20-23. (Canceled).

24. (Currently amended) TheA process as claimed in Claim 15, wherein, before conducting the step of effecting the reductive reaction of L-epi-2-inosose with the reducing agent as added, there is interposed a preliminary step in which the pH of the aqueous medium composed of the culture broth supernatant or of the reaction solution filtrate containing L-epi-2-inosose therein is once adjusted to an alkaline pH in a range of pH 8 to 12; and wherein there is then conducted the step which comprises adding to said aqueous medium containing L-epi-2-inosose and having a pH of 8 to 12 an alkali metal boron hydride, an alkali metal tri-alkoxyboron hydride or an alkali metal boron

cyanide as the reducing agent, and effecting the reductive reaction of L-epi-2- inosose with said reducing agent, whereby the desired epi-inositol is produced in a yield much greater than that of the by-produced myo-inositol.